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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
10/020,945	12/19/2001	Jung-Wan Ko	1293.1071D4	9655	
21171 75	90 07/07/2004		EXAMINER		
STAAS & HALSEY LLP SUITE 700 1201 NEW YORK AVENUE, N.W.			CHU, KIM KWOK		
			ART UNIT	PAPER NUMBER	
WASHINGTO	N, DC 20005		2653	16	
			DATE MAILED: 07/07/200	DATE MAILED: 07/07/2004	

Please find below and/or attached an Office communication concerning this application or proceeding.

• •	L Augustian No.	Applicant(s)				
	Application No.	Applicant(s)				
	10/020,945	KO ET AL.				
Office Action Summary	Examiner	Art Unit				
	Kim-Kwok CHU	2653				
The MAILING DATE of this communication appears on the cover sheet with the correspondence address						
Period for Reply .						
A SHORTENED STATUTORY PERIOD FOR REPI THE MAILING DATE OF THIS COMMUNICATION  - Extensions of time may be available under the provisions of 37 CFR 1 after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a re - If NO period for reply is specified above, the maximum statutory period - Failure to reply within the set or extended period for reply will, by statu Any reply received by the Office later than three months after the maili earned patent term adjustment. See 37 CFR 1.704(b).	136(a). In no event, however, may a reply be tir ply within the statutory minimum of thirty (30) day d will apply and will expire SIX (6) MONTHS from te. cause the application to become ABANDONE	nely filed s will be considered timely. the mailing date of this communication. (D) (35 U.S.C. § 133).				
Status						
1) Responsive to communication(s) filed on Amendment filed on 4/1/04 (paper 14).						
•	is action is non-final.					
	3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is					
	closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.					
Disposition of Claims						
	n the application.					
	Claim(s) 6,7,9,10 and 16-22 is/are pending in the application.  4a) Of the above claim(s) is/are withdrawn from consideration.					
5) Claim(s) 6.7 and 10 is/are allowed.						
6)⊠ Claim(s) <u>9, 16-19 and 21</u> is/are rejected.	, and the second					
7)⊠ Claim(s) <u>20 and 22</u> is/are objected to.						
	8) Claim(s) are subject to restriction and/or election requirement.					
Application Papers						
9)⊠ The specification is objected to by the Examiner.  10)□ The drawing(s) filed on is/are: a)□ accepted or b)□ objected to by the Examiner.						
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).						
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.						
Priority under 35 U.S.C. § 119						
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).						
a)⊠ All b)□ Some * c)□ None of:	ata bassa basan manaksad					
1. Certified copies of the priority docume		tion No. 00/222 520				
2. Certified copies of the priority docume						
3. Copies of the certified copies of the priority documents have been received in this National Stage						
application from the International Bureau (PCT Rule 17.2(a)).						
* See the attached detailed Office action for a list of the certified copies not received.						
Attachment(s)						
1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 4) Interview Summary (PTO-413) Paper No(s)/Mail Date. Paper No(s)/Mail Date.						
Notice of Draftsperson's Patent Drawing Review (F10-946)     Information Disclosure Statement(s) (PTO-1449 or PTO/SB/0)	(18) 5) Notice of Informal	Patent Application (PTO-152)				
Paper No(s)/Mail Date <u>15</u> . 6)  Other:						

## Specification

- 1. The disclosure is objected to because of the following informalities:
- (a) in the specification, on page 1, lines 5 and 6, the term "now pending," should be changed to --now U.S. Patent 6,724,705, issued on April 20, 2004,--.

Appropriate correction is required.

## Claim Rejections - 35 USC § 103

- 2. The following is a quotation of 35 U.S.C. § 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which the subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 3. Claim 9 is rejected under 35 U.S.C. 103(a) as being unpatentable over Igarashi et al. (U.S. Patent ,5,805,539) in view of Childers et al. (U.S. Patent 5,499,233).

Igarashi teaches a write protection method for a recording and/or reproducing apparatus very similar to that of the instant invention. For example, Igarashi teaches the following:

- (a) as in claim 9, a recording medium, including a Lead-in area a Lead-out area and a user area (Fig. 11; column 12, lines 5-23; the user area is the program area and the UTOC area);
- (b) as in claim 9, the user area is set to a write protection state ensuring the protection of data, including the entire user data area or at least a particular data files, recorded on the recording medium from unwanted overwriting or erasing when the finalization for writing on the Lead-in area and the Lead-out area has been completed (Fig. 11; column 6, lines 32-39; finalization is the procedure of writing the Lead-in area and the Lead-out area);
- (c) as in claim 9, checking the state of the recording medium (Fig. 5; inherent feature where the UTOC having write-protection data is check first in order to link the address of the recorded data); and
- (d) as in claim 9, prohibiting writing of data on the recording medium when the state of the recording medium is a write protection state (Fig. 11; inherent feature of a data write-protection management).

However, Igarashi does not teach the following:

(a) as in claim 9, determining whether the state of the recording medium matches a write protection state of a write

inhibit hole of a case or cartridge, wherein the recording medium is positioned, for write protection; and

(b) as in claim 9, preventing writing of the new data on the recording medium if the state of the write inhibit hole is set to a write protection state.

Childers teaches an optical disk carrier having the following features:

- (a) the recording medium is positioned in a case of cartridge 700 having a write inhibit hole 724 for write protection (Fig. 7);
- (b) determining whether the state of the recording medium matches a write protection state of a write inhibit hole of the case or cartridge 700, wherein the recording medium is positioned, for write protection (Fig. 7; checking the write inhibit hole 724 in the case 700); and
- (c) preventing writing of the new data on the recording medium if the state of the write inhibit hole is set to a write protection state (Fig. 7; column 3, lines 9-11; column 1, lines 23-31).

To keep an optical disc from unnecessary human interferences, it would have been obvious to one of ordinary skill in the art to insert an optical disc such as Igarashi's in a protective cartridge such as Childers's, because the cartridge reduces the accumulation of dust, body oils or

surface scratches. Furthermore, the cartridge has a write protection mechanism which can prevent accident overwrite of the disc.

4. Claims 16-18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Igarashi et al. (U.S. Patent ,5,805,539) in view of Kuroda et al. (U.S. Patent 5,818,807).

Igarashi teaches a write protection method for a recording and/or reproducing apparatus very similar to that of the instant invention. For example, Igarashi teaches the following:

- (a) as in claim 16, a recording medium, separately including a Lead-in area, a Lead-out area, a user area, and a recording information area (Fig. 11; column 12, lines 5-23; the user area is the program area, the recording information area is the UTOC area);
- (b) as in claim 16, the recording information area having a Recording Management Area (RMA) (the UTOC includes recording management area such as management table as shown in Figs. 3 and 5);
- (c) as in claim 16, the Recording Management Area includes write protection information to control protection of data including the entire recording medium, except for the RMA,

from unwanted writing or erasing, (Fig. 11; column 6, lines 32-39);

- (d) as in claim 16, checking the write protection information stored in at least one area of the RMA area of the recording medium (Fig. 5; inherent feature where the UTOC having write-protection data is check first in order to link the address of the recorded data); and
- (e) as in claim 16, prohibiting writing of data on the recording medium when the write protection information of the recording medium is set to a write protection state (Fig. 11; inherent feature of a data write-protection management).

However, Igarashi does not teach the following:

- (a) as in claim 16, the recording information areahaving a Power Calibration Area (PCA);
- (b) as in claim 17, the write protection information is stored in a field 0 of a Recording Management Data (RMD) area of the RMA area of the recording medium; and
- (c) as in claim 18, the write protection information is stored in a Byte Position(BP) 2 of the field 0 of the RMD area of the RMA area of the recording medium.

Kuroda teaches an optical medium having a power calibration area (Fig. 1a; PCA is the power calibration area, LI is the lead-in area and LO is the lead-out area).

Although Kuroda does not teach its PCA area is in a recording management area, for the benefit of calibrating power within different programs, it would have been obvious to one of ordinary skill in the art to place the PCA in Kuroda's pregroove area to the reserve area in Igarashi's UTOC area, because the information such as PCA stored in the UTOC area can be managed (monitored, linked etc.) by a user of the recording/reproducing apparatus.

On the other hand, although Igarashi in view of Kuroda do not teach the location of the PCA in the UTOC area, for the benefit of accessing the PCA information before other file addresses, it would have been obvious to one of ordinary skill in the art to place the PCA data at the beginning location of the UTOC such as the reserve area as illustrated in Igarashi's Fig. 14, because PCA data has the address priority over other data so that proper read/write laser power can be set first.

5. Claims 19 and 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Igarashi et al. (U.S. Patent 5,805,539) in view of Kuroda et al. (U.S. Patent 5,818,807) and Childers et al. (U.S. Patent 5,499,233).

Igarashi in view of Kuroda teaches a write protection method for a recording and/or reproducing apparatus very similar to that of the instant invention. However, both Igarashi and Kuroda do not teach the following:

- (a) as in claim 19, the recording medium is positioned in a case of cartridge having a write inhibit hole for write protection;
- (b) as in claim 21, determining whether the recording medium is positioned in a case; and
- (c) as in claim 21, prohibiting the writing of the data on the recording medium if the state of the recording medium is checked as the write protection state in the checking of the state of the case checked in the checking is a write protection state.

Childers teaches an optical disk carrier having the following features:

(a) the recording medium is positioned in a case of cartridge 700 having a write inhibit hole 724 for write protection (Fig. 7);

- (b) determining whether the recording medium is positioned in a case (Fig. 7; checking the write inhibit hole 724 can be considered as a procedure of determining whether the recording medium is positioned in the case 700); and
- (c) prohibiting the writing of the data on the recording medium if the state of the recording medium is checked as the write protection state in the checking of the state of the case checked in the checking is a write protection state (Fig. 7; column 3, lines 9-11; column 1, lines 23-31).

To keep an optical disc from unnecessary human interferences, it would have been obvious to one of ordinary skill in the art to insert an optical disc such as Igarashi's in view of Kuroda's in a protective cartridge such as Childers's, because the cartridge reduces the accumulation of dust, body oils or surface scratches. Furthermore, the cartridge has a write protection mechanism which can prevent accident overwrite of the disc.

### REASONS FOR ALLOWANCE

- 6. Claims 6, 7 and 10 are allowable over the prior art of record.
- 7. Claims 20 and 22 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.
- 8. The following is an Examiner's Statement of Reasons for Allowance based on applicant's amendments filed on April 1, 2004

As in claims 6, 10, 20 and 22, the prior art of record fails to teach or fairly suggests a write protection method of a recording medium having the following steps:

(a) if the state of the recording medium checked in the checking of the state of the recording medium does not match the write protection state of the case, informing a user of the difference.

The features indicated above, in combination with the other elements of the claims, are not anticipated by, nor made obvious over, the prior art of record.

#### Conclusion

The prior art made of record and not relied upon is 9. considered pertinent to applicant's disclosure.

Koyama (5,978,551) is pertinent because Koyama teaches a recording medium having a Lead-in area, a Lead-out area and a recording only management area.

- Any response to this action should be mailed to: Commissioner of Patents and Trademarks Washington, D.C. 20231 Or faxed to:
- (703) 872-9306 (for formal communications intended for entry. Or:
- (703) 746-6909, (for informal or draft communications, please label "PROPOSED" or "DRAFT")

Hand-delivered responses should be brought to Crystal Park 2021 Crystal Drive, Arlington. VA., Sixth Floor (Receptionist).

Any inquiry of a general nature or relating to the status of this application should be directed to the Group receptionist whose telephone number is (703) 305-4700.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kim CHU whose telephone number is (703) 305-3032 between 9:30 am to 6:00 pm, Monday to Friday.

CC 6/25/04

Kim-Kwok CHU Examiner AU2653 June 25, 2004

(703) 305-3032

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